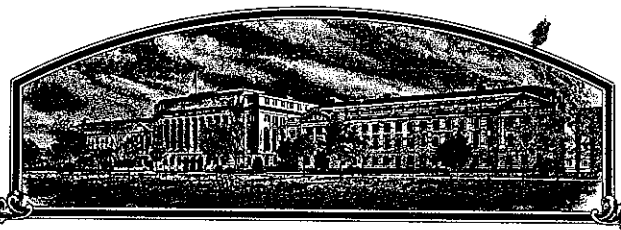
No. 8500069



THE UNITED STATES OF AMERICA

TO ALL TO WHOM THESE PRESENTS SHALL COME:

DeKalb-Pfizer Genetics

Whereas, THERE HAS BEEN PRESENTED TO THE

Secretary of Agriculture

AN APPLICATION REQUESTING A CERTIFICATE OF PROTECTION FOR AN ALLEGED NOVEL VARIETY OF SEXUALLY REPRODUCED PLANT, THE NAME AND DESCRIPTION OF WHICH ARE CONTAINED IN THE APPLICATION AND EXHIBITS, A COPY OF WHICH IS HEREUNTO ANNEXED AND MADE A PART HEREOF, AND THE VARIOUS REQUIREMENTS OF LAW IN SUCH CASES MADE AND PROVIDED HAVE BEEN COMPLIED WITH, AND THE TITLE THERETO IS, FROM THE RECORDS OF THE PLANT VARIETY PROTECTION OFFICE, IN THE APPLICANT(S) INDICATED IN THE SAID COPY, AND WHEREAS, UPON DUE EXAMINATION MADE, THE SAID APPLICANT(S) IS (ARE) ADJUDGED TO BE ENTITLED TO A CERTIFICATE OF PLANT VARIETY PROTECTION UNDER THE LAW.

NOW, THEREFORE, THIS CERTIFICATE OF PLANT VARIETY PROTECTION IS TO GRANT UNTO THE SAID APPLICANT(S) AND THE SUCCESSORS, HEIRS OR ASSIGNS OF THE SAID APPLICANT(S) FOR THE TERM OF eighteen YEARS FROM THE DATE OF THIS GRANT, SUBJECT TO THE PAYMENT OF THE REQUIRED FEES AND PERIODIC REPLENISHMENT OF VIABLE BASIC SEED OF THE VARIETY IN A PUBLIC REPOSITORY, AS PROVIDED BY LAW, THE RIGHT TO EXCLUDE OTHERS FROM SELLING THE VARIETY, OR OFFERING IT FOR SALE, OR REPRODUCING IT, IMPORTING IT, OR EXPORTING IT, OR USING IT IN PRODUCING A HYBRID OR DIFFERENT ETY THEREFROM, TO THE EXTENT PROVIDED BY THE PLANT VARIETY PROTECTION ACT T. 1542, AS AMENDED, 7 U.S.C. 2321 ET SEQ.)

CORN

'HBA1'

In Testimony Whereof, *I have hereunto set my hand and caused the seal of the* Plant Variety Protection Office *to be affixed at the City of* Washington, D. C. *this* 30th *day of* September *in the year of our Lord one thousand nine hundred and* eighty-six.

Attest:

Kenneth B. Evans
Commissioner
Plant Variety Protection Office
Agricultural Marketing Service

Richard E. Lyng
Secretary of Agriculture

APPROVAL EXPIRES 4-30-85

U.S. DEPARTMENT OF AGRICULTURE
AGRICULTURAL MARKETING SERVICE
WAREHOUSE & SEED DIVISION

APPLICATION FOR PLANT VARIETY PROTECTION CERTIFICATE

(Instructions on reverse)

FORM APPROVED: OMB NO. 0581-0055

Application is required in order to determine if a plant variety protection certificate is to be issued (7 U.S.C. 2421). Information is held confidential until certificate is issued (7 U.S.C. 2426).

1. NAME OF APPLICANT(S)
DeKalb-Pfizer Genetics

2. TEMPORARY DESIGNATION
HBA1

3. VARIETY NAME
HBA1

4. ADDRESS *(Street and No. or R.F.D. No., City, State, and Zip Code)*
3100 Sycamore Road
DeKalb, Illinois 60115

5. PHONE *(Include area code)*
815-756-3671

FOR OFFICIAL USE ONLY

PVPO NUMBER
8500069

6. GENUS AND SPECIES NAME
Zea Mays

7. FAMILY NAME *(Botanical)*
Gramineae

FILING
DATE 2/21/85
TIME 2:30 ☐ A.M. ☒ P.M.

8. KIND NAME
Corn

9. DATE OF DETERMINATION
Fall 1982

FEES RECEIVED
AMOUNT FOR FILING
$ 1,800
DATE 2/21/85
AMOUNT FOR CERTIFICATE
$ 200.00
DATE September 4, 1986

10. IF THE APPLICANT NAMED IS NOT A "PERSON," GIVE FORM OF ORGANIZATION *(Corporation, partnership, association, etc.)*
General Partnership

11. IF INCORPORATED, GIVE STATE OF INCORPORATION
N/A

12. DATE OF INCORPORATION

13. NAME AND ADDRESS OF APPLICANT REPRESENTATIVE(S), IF ANY, TO SERVE IN THIS APPLICATION AND RECEIVE ALL PAPERS
*Waddell A. Biggart, Sughrue, Mion, Zinn, Macpeak & Seas, 1776 K Street, N.W., Washington, D.C. 20006 (202) 293-7060; Eric Christophersen, Esq., 3100 Sycamore Road, DeKalb, Illinois 60115; Dr. James H. Monroe, Legal Division, Pfizer Inc., 235 E. 42nd St., NY,NY 10017 (212) 573-2369
PHONE *(Include area code)*:

14. CHECK APPROPRIATE BOX FOR EACH ATTACHMENT SUBMITTED

a. ☒ Exhibit A, Origin and Breeding History of the Variety *(See Section 52 of the Plant Variety Protection Act.)*

b. ☒ Exhibit B, Novelty Statement

c. ☒ Exhibit C, Objective Description of the Variety *(Request form from Plant Variety Protection Office.)*

d. ☒ Exhibit D, Additional Description of the Variety

e ☒ EXHIBIT E, OWNERSHIP STATEMENT

15. DOES THE APPLICANT(S) SPECIFY THAT SEED OF THIS VARIETY BE SOLD BY VARIETY NAME ONLY AS A CLASS OF CERTIFIED SEED? *(See Section 83(a) of the Plant Variety Protection Act.)*
☐ Yes *(If "Yes," answer items 16 and 17 below)* ☒ No

16. DOES THE APPLICANT(S) SPECIFY THAT THIS VARIETY BE LIMITED AS TO NUMBER OF GENERATIONS?
☐ Yes ☒ No

17. IF "YES" TO ITEM 16, WHICH CLASSES OF PRODUCTION BEYOND BREEDER SEED?
☐ Foundation ☐ Registered ☐ Certified

18. DID THE APPLICANT(S) FILE FOR PROTECTION OF THE VARIETY IN THE U.S.?
☐ Yes *(If "Yes," give date)*
☒ No

19. HAS THE VARIETY BEEN OFFERED FOR SALE OR MARKETED IN THE U.S. OR OTHER COUNTRIES?
☐ Yes *(If "Yes," give names of countries and dates)*
☒ No

20. The applicant(s) declare(s) that a viable sample of basic seeds of this variety will be furnished with the application and will be replenished upon request in accordance with such regulations as may be applicable.

The undersigned applicant(s) is (are) the owner(s) of this sexually reproduced novel plant variety, and believe(s) that the variety is distinct, uniform, and stable as required in Section 41, and is entitled to protection under the provisions of Section 42 of the Plant Variety Protection Act.

Applicant(s) is (are) informed that false representation herein can jeopardize protection and result in penalties.

SIGNATURE OF APPLICANT
[signature], President
DATE
February 19, 1985

SIGNATURE OF APPLICANT

DATE

FORM WA-470 (3-84) (Formerly LMGS-470 (8-83) which is obsolete.)

NOTE: *Please address all correspondence to W.A. Biggart, Esq., Washington, D.C.

Exhibit A. Origin and Breeding History of the Variety.

Origin and Breeding History of Dent Corn Inbred HBA1

Summer 1977	The cross of hybrids 3195 x 3199, both commercially available from Pioneer HiBred, was made at Windfall, Indiana. 3199 was the female (range 171 row 61) and 3195 was the male (panel 179).
Winter 1977-78	The above seed was grown in Hawaii; the plants were selfed one generation and the resulting seed was used in the next generation.
Summer 1978	Approximately 600 plants were grown in 16 rows at St. Louis, Missouri. Thirty-five self-pollinated ears were saved. (Range 16 rows 67-82.)
Winter 1978	Thirty-five ear-rows were grown. Four self-pollinated ears were saved from ear one. (Range 130 row 10.)
Summer 1979	Four ears were grown at St. Louis, Missouri. One self-pollinated ear was saved from ear one. (Range 8 row 34.)
Winter 1980	One ear was grown. Two self-pollinated ears were saved from ear one. (Range 311 row 40.)
Summer 1981	Two ears were grown at St. Louis. Seven self-pollinated ears were saved from ear one. (Range 80 row 35.) Test crosses were made to B73, PA91, and W72628.
Winter 1981	Three ears were grown. Six self-pollinated ears were saved from ear one. (Range 293 row 33.)
Summer 1982	Six ears were grown at St. Louis. Twelve ears were saved from ear one to bulk and to name HBA1. (Range 203 row 31.) Test crosses made in 1981 were grown and new test crosses with TS7057 and TS7075 were made.

The initial cross of 3195 with 3199 was made at the request of Dr. A. F. Troyer and subsequent selection with segregating generation was made by him.

STATEMENT OF VARIANTS

The corn inbred HBA1 is uniform for all traits.

A. FORREST TROYER
Vice President

STATEMENT OF UNIFORMITY

This inbred was assigned the code HBA1 after eight generations of selfing and was judged uniform for breeding use. HBA1 has been reproduced and judged uniform for breeding use in winter and summer programs for an additional six generations.

A. FORREST TROYER
Vice President

8500069

03370/4/002
DEKALB-PFIZER GENETICS
Applicant

HBA1, Exhibit A, Appendium I

BOX 357
ILLICPOLIS IL 62539

TEST Date NOVEMBER 02, 1984

Test No. 404710 Lot No. 230923

Kind & Variety (Producers Declaration)
FOUNDATION AF389 CORN

THIS SAMPLE MEETS CERTIFICATION REQUIREMENTS BASED ON SOURCE OF SEED, FIELD INSPECTION AND LABORATORY ANALYSIS

GERMINATION REPORT: 400 Seeds

Germination	%	Strong	%	Cold Test	%
Hard Seed	%	Pod & Stem Blight	%	A-A Test	%
Dead Seed	%	Other Diseases	%	Tetrazolium	%

PURITY REPORT:

Pure Seed	%	Test Weight	LBS.
Weed Seeds	%		
Other Crop Seeds	%	Moisture	11.10 %
Total Inert Matter	%		
Broken Seed	%	Total Weight of Sample Examined:	500.00
Other Inert	%		
		Dockage from 1,000 grams:	

Noxious Weeds	Other Weed Seeds
NONE FOUND	NONE FOUND
Other Crop Seeds	**Inert Matter**
NONE FOUND	

REMARKS:

This certifies that the sample of seed submitted of the lot designated above has been analyzed in accordance with the RULES FOR SEED TESTING AS ADOPTED BY THE ASSOCIATION OF OFFICIAL SEED ANALYSTS. VIGOR TESTING INFORMATION CANNOT BE USED FOR LABELING PURPOSES.

ILLINOIS CROP IMPROVEMENT ASSOCIATION, INC.
508 South Broadway, Urbana, Illinois 61801
Telephone: 217-367-4053

Registered Seed Technologist

James R. Sherl
Manager

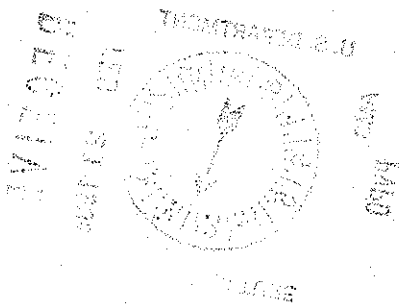
FORM 3-0881

Exhibit B. Novelty Statement

HBA1 is a yellow dent corn inbred that can best be described as having an inbred Ohio 7 background.

The public line that is most similar to HBA1 is PA91. HBA1 is statistically different from PA91 in ear height (134.7 vs 132.2), tassel branch number (8.9 vs 16.0) and tassel branch angle (28.3° vs 42.3°). (See Exhibit B, Appendium I).

Additional distinguishing differences are: the kernel row of HBA1 is more distinct than PA91 and the kernel row of HBA1 is straighter than PA91. (See Exhibit B, Appendium II).



HBA1

Exhibit B. Novelty Statement

Appendium I.

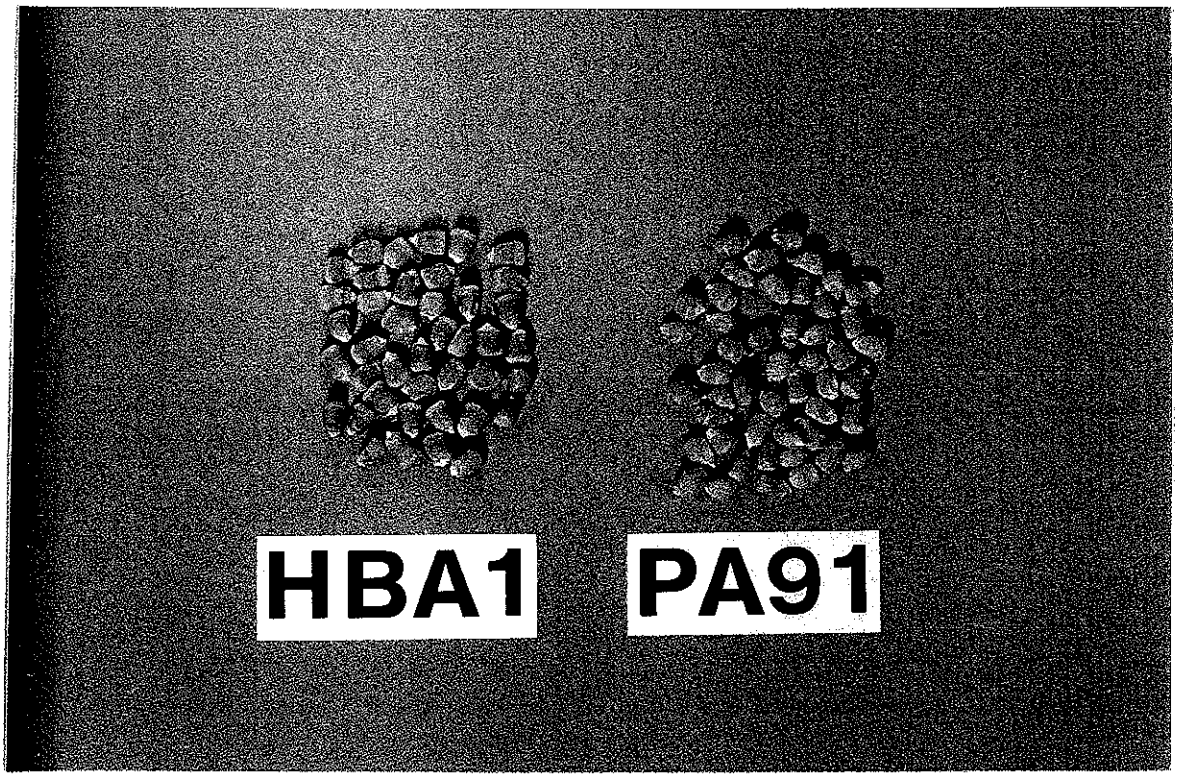
HBA1 vs PA91

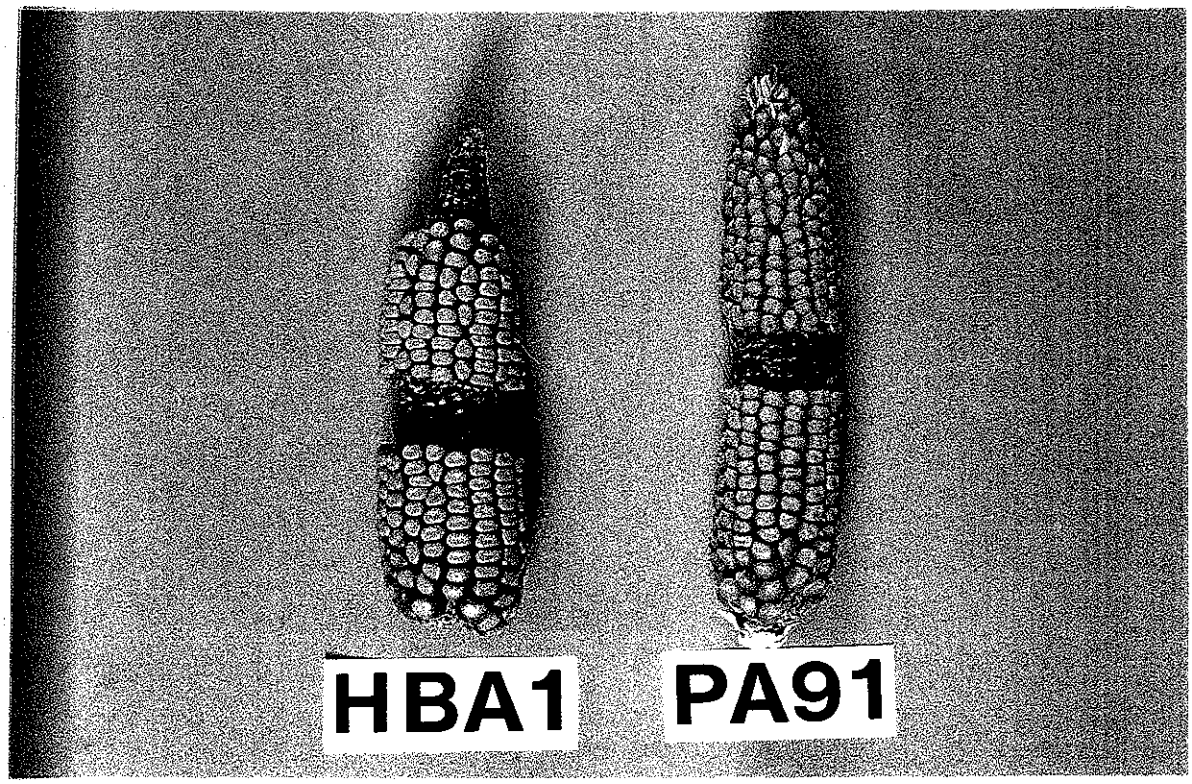
Ear Characteristics	HBA1	PA91	Testing Hypothesis Ho: $\mu_1 = \mu_2$ $H_A: \mu_1 \neq \mu_2$
1. Ear Length (cm)	$\bar{X}_1$ = 16.6	$\bar{X}_2$ = 17.1	Not Significant (α = 0.10)
2. Ear Diameter (cm)	$\bar{X}_1$ = 4.1	$\bar{X}_2$ = 3.9	Not Significant (α = 0.10)
3. Ear Weight (gm)	$\bar{X}_1$ =134.7	$\bar{X}_2$ =132.2	Significant (α = 0.10)
4. Tassel Branch Number	$\bar{X}_1$ = 8.9	$\bar{X}_2$ = 16.0	Significant (α = 0.10)
5. Number of Kernel Rows	$\bar{X}_1$ = 16.9	$\bar{X}_2$ = 15.4	Not Significant (α = 0.10)
6. Tassel Branch Angel (°)	$\bar{X}_1$ = 28.3°	$\bar{X}_2$ = 42.3	Significant (α = 0.10)
7. Silk Color	Violet	Yellow	

1) $n_1 = n_2 = 100$

2) Detailed calculations for this and other information are available.

14B. Exhibit B. Novelty Statement, Appendium II.





HBA1 and PA91 have a dent kernel. The cob color of HBA1 and PA91 is red. However, cob strength of HBA1 is significantly stronger than PA91.

FORM APPROVED: OMB NO. 40-R3822

U.S. DEPARTMENT OF AGRICULTURE
AGRICULTURAL MARKETING SERVICE
LIVESTOCK, POULTRY, GRAIN & SEED DIVISION
BELTSVILLE, MARYLAND 20705

EXHIBIT C
(Corn)

OBJECTIVE DESCRIPTION OF VARIETY
CORN *(ZEA MAYS)*

HBA1

NAME OF APPLICANT(S)

DeKalb-Pfizer Genetics

ADDRESS *(Street and No. or R.F.D. No., City, State, and ZIP Code)*

3100 Sycamore Road
DeKalb, Illinois 60115

FOR OFFICIAL USE ONLY

PVPO NUMBER 8500069

VARIETY NAME OR TEMPORARY DESIGNATION

Place the appropriate number that describes the varietal character of this variety in the boxes below.
Place a zero in first box (e.g. [0][8][9] or [0][9]) when number is either 99 or less or 9 or less.

1. TYPE:

[2]

1 = SWEET 2 = DENT 3 = FLINT 4 = FLOUR 5 = POP 6 = ORNAMENTAL

2. REGION WHERE BEST ADAPTED IN THE U.S.A.:

[5]

1 = NORTHWEST 2 = NORTHCENTRAL 3 = NORTHEAST 4 = SOUTHEAST
5 = SOUTHCENTRAL 6 = SOUTHWEST 7 = MOST REGIONS

3. MATURITY (In Region of Best Adaptability):

(Under "comments" (pg. 3) state how heat units were calculated)

[6][1]	DAYS FROM EMERGENCE TO 50% OF PLANTS IN SILK	[1][4][4][6] HEAT UNITS
[N][A]	DAYS FROM 50% SILK TO OPTIMUM EDIBLE QUALITY	[N][A][ ][ ] HEAT UNITS
[8][1]	DAYS FROM 50% SILK TO HARVEST AT 25% KERNEL MOISTURE	[1][5][2][5] HEAT UNITS

4. PLANT:

[2][3][6] CM. HEIGHT (To tassel tip)

[0][7][2] CM. EAR HEIGHT (To base of top ear)

[1][4] CM. LENGTH OF TOP EAR INTERNODE

Number of Tillers:

[1]

1 = NONE 2 = 1–2 3 = 2–3 4 = > 3

Number of Ears Per Stalk:

[2] 1 = SINGLE 2 = SLIGHT TWO-EAR TENDENCY
3 = STRONG TWO-EAR TENDENCY 4 = THREE-EAR TENDENCY

Cytoplasm Type:

[1]

1 = NORMAL 2 = "T" 3 = "S" 4 = "C" 5 = OTHER (Specify) _____

5. LEAF (Field Corn Inbred Examples Given):

Color:

[2]

1 = LIGHT GREEN (HY) 2 = MEDIUM GREEN (WF9) 3 = DARK GREEN (B14) 4 = VERY DARK GREEN (K166)

Angle from Stalk (Upper half):

[1]

1 = < 30° 2 = 30–60° 3 = > 60°

Sheath Pubscence:

[1]

1 = LIGHT (W22) 2 = MEDIUM (WF9)
3 = HEAVY (OH26)

Marginal Waves:

[2]

1 = NONE (HY) 2 = FEW (WF9) 3 = MANY (OH7L)

Longitudinal Creases:

[1]

1 = ABSENT (OH51) 2 = FEW (OH56A)
3 = MANY (PA11)

Width:

[0][9] CM. WIDEST POINT OF EAR NODE LEAF

Length:

[0][8][3] CM. EAR NODE LEAF

[2][0] NUMBER OF LEAVES PER MATURE PLANT

9

6. TASSEL:

[0 9] NUMBER OF LATERAL BRANCHES

Branch Angle from Central Spike:

[1] 1 = < 30° 2 = 30–40° 3 = > 45°

Penduncle Length:

[1 0] CM. FROM TOP LEAF TO BASAL BRANCHES

Pollen Shed:

[3] 1 = LIGHT (WF9) 2 = MEDIUM 3 = HEAVY(KY21)

[1] **Anther Color:** } 1 = YELLOW 2 = PINK 3 = RED 4 = PURPLE 5 = GREEN
[5] **Glume Color:** } 6 = OTHER (Specify) _____

Pollen Restoration for Cytoplasms (o = Not Tested, 1 = Partial, 2 = Good)

[0] "T" [0] "S" [0] "C" [ ] OTHER (Specify Cytoplasm and degrees of restoration) _____

7. EAR (Husked Ear Data Except When Stated Otherwise):

[1 7] CM LENGTH [4 1] MM. MID-POINT DIAMETER [1 3 5] GM. WEIGHT

Kernel Rows:

[2] 1 = INDISTINCT 2 = DISTINCT [1 6] NUMBER

[1] 1 = STRAIGHT 2 = SLIGHTLY CURVED 3 = SPIRAL

Silk Color (Exposed at Silking Stage):

[5] 1 = GREEN 2 = PINK 3 = SALMON 4 = RED 5. Other Violet

Husk Color:

[7] FRESH } 1 = LIGHT GREEN 2 = DARK GREEN 3 = PINK
[6] DRY } 4 = RED 5 = PURPLE 6 = BUFF 7. Other Med. Green

Husk Extention: (Harvest Stage)

[2] 1 = SHORT (Ears Exposed) 2 = MEDIUM (Barely Covering Ear) 3 = LONG (8–10CM Beyond Ear Tip) 4 = VERY LONG (> 10 CM)

Husk Leaf:

[1] 1 = SHORT (< 8 CM) 2 = MEDIUM (8–15 CM) 3 = LONG (> 15 CM)

Shank:

[1 0] CM LONG [7] NO. OF INTERNODES

Position at Dry Husk Stage:

[1] 1 = UPRIGHT 2 = HORIZONTAL 3 = PENDENT

Taper:

[2] 1 = SLIGHT 2 = AVERAGE 3 = EXTREME

Drying Time (Unhusked Ear):

[1] 1 = SLOW 2 = AVERAGE 3 = FAST

8. KERNEL (Dried):

Size (From Ear Mid-Point):

[1 0] MM LONG [0 8] MM. WIDE [0 4] MM. THICK

Shape Grade (% Rounds)

[4] 1 = < 20 2 = 20–40 3 = 40–60 4 = 60–80 5 = > 80

8500069

8. KERNEL (Dried) :

[1] **Pericarp Color:** 1 = COLORLESS 2 = RED-WHITE CROWN 3 = TAN 4 = BRONZE 5 = BROWN 6 = LIGHT RED 7 = CHERRY RED 8 = VARIEGATED (Describe) _____

[1] **Aleurone Color:** 1 = HOMOZYGOUS 2 = SEGREGATING (Describe) _____

[8] 1 = WHITE 2 = PINK 3 = TAN 4 = BROWN 5 = BRONZE 6 = RED 7 = PURPLE 8 = PALE PURPLE 9 = VARIEGATED (Describe) _____

[3] **Endosperm Color:** 1 = WHITE 2 = PALE YELLOW 3 = YELLOW 4 = PINK-ORANGE 5 = WHITE CAP.

Endosperm Type:

[3] 1 = SWEET (su1) 2 = EXTRA SWEET (sh2) 3 = NORMAL STARCH 4 = HIGH AMYLOSE STARCH 5 = WAXY STARCH 6 = HIGH PROTEIN 7 = HIGH LYSINE 8 = OTHER (Specify) _____

[3][0] GM. WEIGHT /100 SEEDS (Unsized Sample)

9. COB:

[2][0] MM. DIAMETER AT MID-POINT

Strength:

[2] 1 = WEAK 2 = STRONG

Color:

[3] 1 = WHITE 2 = PINK 3 = RED 4 = BROWN 5 = VARIEGATED 6 OTHER (Specify) _____

10. DISEASE RESISTANCE (0 = Not Tested, 1 = Susceptible, 2 = Resistant):

[0]	STALK ROT (Diplodia)	[0]	STALK ROT (Fusarium)	[0]	STALK ROT (Gibberella)
[2]	NORTHERN LEAF BLIGHT (Race 1 and 2)	[2]	SOUTHERN LEAF BLIGHT (Race 0)	[0]	SMUT
[0]	SOUTHERN RUST	[0]	CORN SMUT	[0]	BACTERIAL WILT
[0]	BACTERIAL LEAF BLIGHT	[0]	MAIZE DWARF MOSAIC	[0]	STUNT
[2]	OTHER (Specify) H. Carbonum Race 2	2	H. Carbonum Race 3		

11. INSECT RESISTANCT (0 = Not Tested, 1 = Susceptible, 2 = Resistant):

[2]	CORNBORER (1st Brood)	[0]	EARWORM	[0]	SAPBEETLE	[0]	APHID
[0]	ROOTWORM (Northern)	[0]	ROOTWORM (Western)				
[0]	ROOTWORM (Southern)	[2]	OTHER (Specify) Ostrinia Nubilalis (2nd Brood)				

12. VARIETIES MOST CLOSELY RESEMBLING THAT SUBMITTED FOR THE CHARACTERS GIVEN:

CHARACTER	VARIETY	CHARACTER	VARIETY
Maturity	PA91	Kernel Type	PA91
Plant Type	PA91	Quality (Edible)	
Ear Type	PA91	Usage	

REFERENCES:

U.S. Department Agriculture. Yearbook 1937.

Corn: Culture, Processing, Products. 1970 Avi Publishing Company, Westport, Connecticut. (Numerous (Authors)

Emerson, R.A., G.W. Beadle, and A.C. Fraser. A Summary of Linkage Studies in Maize. Cornell A.E.S., Mem. 180. 1935.

The Mutants of Maize. 1968. Crop Science Society of America. Madison, Wisconsin.

Stringfield, G.H. Maize Inbred Lines of Ohio. Ohio A.E.S. Bul. 831. 1959.

Butler, D.R. 1954 – A System for the Classification of Corn Inbred Lines – PhD. Thesis, Ohio State University.

COMMENTS: Heat Unit Calculations:

GDD = Daily Max. Temp. (≤86°F) + Daily Min. Temp. (≥50°F) − 50°F
2

Exhibit D

Additional Description of the Variety

The Isozyme analysis of HBA1 and PA91 shows genetic differences at three different loci: Acph - 2 vs. 4, IdhB - 6 vs. 4, and PhI - 5 vs. 4.

(See Exhibit D, Appendium I).

Comment

This observation is based on preliminary results and the final Isozyme results will be submitted later.

Exhibit D.

Additional Description of the Variety

Appendium I

Isozyme Genotypes of HBA1

Locus	Alleles Present		
	HBA1	B73	PA91
ACPH	2	2	4
ADH	4	4	4
Cat	9	9	9
EP	6	6	6
GOT U	4	4	4
GOT M	4	4	4
GOT L	4	4	4
B-Glu	6	7	7
MDH A	6*	6*	6*
MDH B	6	3.5	3.5
MDH C	16	16	16
MDH D	12	12	12
MDH E	12	12	12
PGM A	9	9	9
PGM B	4	4	4
PHI	5	4	4
# of plants assayed	81	6	6

* Allele is probably 6 but null cannot be ruled out.

The technique of using isozymes for genotyping or "fingerprinting" is described by the following reference:

Goodman, M.M. and C. M. Stuber. 1980
Genetic identification of lines and crosses using isoenzyme electrophoresis. Proceedings of the Thirty-fifth Annual Corn and Sorghum Industry Research Conference.

8500069

LAW OFFICES
SUGHRUE, MION, ZINN, MACPEAK & SEAS
1776 K STREET, N. W.
WASHINGTON, D. C. 20006-2359

TELEPHONE
(202) 293-7060

CABLE ADDRESS
LEXPAT WASHINGTON

TELEX 248503

FACSIMILE
(202) 293-7860

RICHARD C. SUGHRUE, P. C.
JOHN H. MION, P. C.
DONALD E. ZINN, P. C.
THOMAS J. MACPEAK, P. C.
ROBERT J. SEAS, JR., P. C.
DARRYL MEXIC, P. C.
ROBERT V. SLOAN, P. C.*
PETER D. OLEXY, P. C.
J. FRANK OSHA
WADDELL A. BIGGART, P. C.
ROBERT G. McMORROW, P. C.
LOUIS GUBINSKY, P. C.
NEIL B. SIEGEL
DAVID J. CUSHING
CYNTHIA CLARKE DALE
JOHN R. INGE#
JOHN K. DONAGHY△
JOSEPH J. RUCH, JR.°
KARL BOZICEVIC
RICHARD C. TURNER
ROBERT D. LITOWITZ
CHRIS COMUNTZIS
RONALD I. EISENSTEIN
KENNETH J. BURCHFIEL
CHARLES S. P. GUENZER
WILLIAM M. WANNISKY
GORDON KIT
SUSAN M. JOVANOVICH

OF COUNSEL
SHELDON I. LANDSMAN, P. C.

*MD; #MA; △VA; °PA, VA

February 21, 1985

EXHIBIT E

Plant Variety Protection Office
United States Department of
Agriculture
AMS-USDA
Room 500 -- National Agricultural
Library Building
Beltsville, Maryland 20705

Re: Plant Variety Protection Certificate Application
Hybrid Inbred Corn Line HBA1

Dear Sirs:

Dr. A. Forrest Troyer, breeder of corn line HBA1, was from 1977 through July 14, 1982, a full-time employee of Pfizer Genetics, Inc. DeKalb Pfizer Genetics, a general partnership between DeKalb AgResearch, Inc. and Pfizer Genetics, Inc., succeeded on July 15, 1982, to substantially all of the assets of Pfizer Genetics, Inc., including all rights to HBA1. From July 15, 1982, to the present, Dr. Troyer has been a full-time employee of DeKalb Pfizer Genetics.

Very truly yours,

Waddell A Biggart

Waddell A. Biggart